CBSLJS5

UNIVERSITY OF GREATER MANCHESTER

SCHOOL OF HEALTH, SCIENCE AND SOCIETY

BSc (HONS) MEDICAL BIOLOGY

BSc (HONS) BIOMEDICAL SCIENCE

SEMESTER ONE EXAMINATION 2025/2026

BIOLOGICAL BASIS OF DISEASE AND THERAPEUTICS

MODULE NO: BIO6011 AND BIO6029

Date: Friday 16 January 2026 **Time: 10.00 am – 1.00 pm**

INSTRUCTIONS TO CANDIDATES:

Candidates are advised that the examiners attach importance to legibility of writing and clarity of expression. YOU ARE STRONGLY YOU ARE ADVISED TO PLAN YOUR ANSWERS.

There are FIVE questions.

Answer ANY THREE questions.

All questions carry equal marks.

This examination paper carries a total of 150 marks.

PAST EXAMINATION

School of Health, Science and Society
BSc (Hons) Medical Biology/BSc (Hons) Biomedical Science
Semester One Examination 2025/2026
Biological Basis of Disease and Therapeutics
Module No. BIO6011/BIO6029

Answer **ANY THREE** questions: each question is worth 50 marks. You should spend approximately one hour on each question.

1. Discuss the cellular changes that take place during the onset of cancer. Compare and contrast a range of treatment options used in cancer therapy. Your answer should include traditional chemotherapy and novel targeted drugs, and you should also consider the role of drug resistance in cancer.

50 marks

2. Outline the causes and symptoms of acute coronary syndrome (ACS) and include a discussion as to how acute coronary syndrome leads to other cardiovascular pathologies. Evaluate the treatment options that are used to manage ACS and include a discussion on the mechanism of action of specific drugs.

50 marks

3. Discuss the aetiology of a range of gastrointestinal pathologies. Critically evaluate the current treatments for these conditions and include the mechanism by which the different treatments have their effect.

50 marks

Please turn the page

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4. Describe the factors that make some bacterial species pathogenic. Discuss the use of antibiotics in the treatment of bacterial infections and include a discussion of antibiotic resistance in your answer.

50 marks

5. Discuss the mechanisms that result in immunological tolerance. Describe in detail the molecular and cellular processes that result in specific autoimmune diseases, and how this knowledge is used in their treatment.

50 marks

TOTAL MARKS 150

END OF QUESTIONS

PAST EXAMINATION